

GUIDE TO THE IMPLEMENTATION OF ELECTRONIC TRANSCRIPTS AND STUDENT RECORDS

Pre-Kindergarten Through Postsecondary Edition

Part 6 of 9

Transaction Set 997 Functional Acknowledgment

Authored by Members of the
American National Standards Institute
Accredited Standards Committee X12
Subcommittee A: Education Administration

Version 4
April 1998

Note to User:

The Electronic Transcripts and Student Records suite of formats is made up of five transaction sets:

TS130-Student Educational Record (Transcript)
TS131-Student Educational Record (Transcript) Acknowledgment
TS146-Request for Student Educational Record (Transcript)
TS147-Response to Request for Student Educational Record (Transcript)
TS997-Functional Acknowledgment

The "Guide to the Implementation of Electronic Transcripts and Student Records, Pre-Kindergarten through Postsecondary Edition" provides usage details for the elementary, secondary, and postsecondary education communities. Based on ANSI ASC X12 Version 4 Release 1, the Guide was made available in April 1998.

Part 1--Chapters 1-3: Additional critical information for proper use of the transaction sets as a whole

Chapter 1: Introduction

Chapter 2: ASC X12 Nomenclature

Chapter 3: Acknowledgment Process

Part 2--TS130: Student Educational Record (Transcript)

Part 3--TS131: Student Educational Record (Transcript) Acknowledgment

Part 4--TS146: Request for Student Educational Record (Transcript)

Part 5--TS147: Response to Request for Student Educational Record (Transcript)

Part 6--TS997: Functional Acknowledgment

Part 7--Appendix A: Change Summary

Part 8--Appendix B: Data Element Dictionary

Part 9--Appendix C: Segment Summary

The above documentation is available electronically, free of charge, in Microsoft Word 97 format (.doc), Portable Document Format (.pdf), and Rich Text Format (.rtf) from <http://nces.ed.gov/edi.html> under the "Implementation Documents" link. Bound copies may be purchased from the AACRAO Distribution Center by calling (301) 490-7651 or by fax at (301) 206-9789. The publication order number is 6007.

Documentation for the five transaction sets was developed using SpecBuilder Version 3.2 from EDIfECS Corporation and is downloadable in native SpecBuilder format (.eds) from their web page-<http://www.edifecs.com>. This format provides a navigable version of the transaction sets and is intended to be used as a replacement for the hyper-linked capability provided in the previous version of the Guide. A copy of either SpecViewer (downloadable, free of charge, from the EDIfECS home page) or SpecBuilder (available from EDIfECS) is required to view the native SpecBuilder output. While it is possible to print from either SpecViewer or SpecBuilder, it is suggested that locally printed copies be generated from the .doc, .pdf, or .rtf files since they have been enhanced for that purpose.

A postsecondary edition has been published by the Postsecondary Electronic Standards Council and is available, free of charge, electronically at <http://www.standardscouncil.org/transsets.htm>. Bound copies may be purchased from the AACRAO Distribution Center by calling (301) 490-7651 or by fax at (301) 206-9789. The publication order number is 6006.

997

Functional Acknowledgment

Functional Group=FA

This Draft Standard for Trial Use contains the format and establishes the data contents of the Functional Acknowledgment Transaction Set (997) for use within the context of an Electronic Data Interchange (EDI) environment. The transaction set can be used to define the control structures for a set of acknowledgments to indicate the results of the syntactical analysis of the electronically encoded documents. The encoded documents are the transaction sets, which are grouped in functional groups, used in defining transactions for business data interchange. This standard does not cover the semantic meaning of the information encoded in the transaction sets.

Heading (Table 1):

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Notes</u>	<u>Usage</u>	<u>Page</u>
010	ST	Transaction Set Header	M	1		N1/010	Must use	5
020	AK1	Functional Group Response Header	M	1		N1/020	Must use	6
LOOP ID - AK2			999999					
030	AK2	Transaction Set Response Header	O	1		N1/030	Used	7
LOOP ID - AK3			999999					
040	AK3	Data Segment Note	O	1			Used	8
050	AK4	Data Element Note	O	99			Used	10
060	AK5	Transaction Set Response Trailer	M	1			Must use	11
070	AK9	Functional Group Response Trailer	M	1			Must use	13
080	SE	Transaction Set Trailer	M	1			Must use	15

Notes:

- 1/010 These acknowledgments shall not be acknowledged, thereby preventing an endless cycle of acknowledgments of acknowledgments. Nor shall a Functional Acknowledgment be sent to report errors in a previous Functional Acknowledgment.
The Functional Group Header Segment (GS) is used to start the envelope for the Functional Acknowledgment Transaction Sets. In preparing the functional group of acknowledgments, the application sender's code and the application receiver's code, taken from the functional group being acknowledged, are exchanged; therefore, one acknowledgment functional group responds to only those functional groups from one application receiver's code to one application sender's code.
There is only one Functional Acknowledgment Transaction Set per acknowledged functional group.
- 1/020 AK1 is used to respond to the functional group header and to start the acknowledgement for a functional group. There shall be one AK1 segment for the functional group that is being acknowledged.
- 1/030 AK2 is used to start the acknowledgement of a transaction set within the received functional group. The AK2 segments shall appear in the same order as the transaction sets in the functional group that has been received and is being acknowledged.

Note to User:

Segments can carry different connotations depending on their location within the transaction set. Therefore, instructions within a segment are tailored to the segment's relative position.

Valid values for a particular instance of a data element are also highly dependent on the data element's location. Relevant code values for a data element are listed with each occurrence unless the list is very long AND all codes are relevant regardless of location within the transaction set. The country codes for data element 26 in the N4 segment, for example, are only listed in Appendix B. Some code values for some data elements have extended definitions to further explain the usage of the code. Extended definitions are listed only in Appendix B unless required for proper interpretation as is the case with many occurrences of Data Element 1073-Yes/No Condition or Response Code.

A new attribute column, Usage, appears in this version of the Guide. Codes for this column are:

Must Use = must be sent

Used = may be sent but is not required

K12 Only = sent only in elementary/secondary to elementary/secondary transmissions

Postsec Only = sent only in transmissions from postsecondary institutions

Not Used = not used in this transaction set at the current position

Refer to Chapter 2 for a complete description of the columns and codes used in the segment summary and the segment details which follow.

ST Transaction Set Header

Pos: 010	Max: 1
Heading - Mandatory	
Loop: N/A	Elms: 2

To indicate the start of a transaction set and to assign a control number

Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
ST01	143	Transaction Set Identifier Code Description: Code uniquely identifying a Transaction Set <u>Code</u> <u>Description</u> 997 Functional Acknowledgment	M	ID	3/3	Must use
ST02	329	Transaction Set Control Number Description: Identifying control number that must be unique within the transaction set functional group assigned by the originator for a transaction set Note to User: This is the identifying control number assigned and maintained by the sender of the transaction set. This value is assigned by the sender in such a way that it is unique to the transaction being sent. This value must match that in data element SE02.	M	AN	4/9	Must use

Semantics:

1. The transaction set identifier (ST01) used by the translation routines of the interchange partners to select the appropriate transaction set definition (e.g., 810 selects the Invoice Transaction Set).

AK1 Functional Group Response Header

Pos: 020	Max: 1
Heading - Mandatory	
Loop: N/A	Elms: 2

To start acknowledgment of a functional group

Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>										
AK101	479	Functional Identifier Code Description: Code identifying a group of application related transaction sets <table><tr><th><u>Code</u></th><th><u>Description</u></th></tr><tr><td>AK</td><td>Student Educational Record (Transcript) Acknowledgment (131)</td></tr><tr><td>ED</td><td>Student Educational Record (Transcript) (130)</td></tr><tr><td>RY</td><td>Request for Student Educational Record (Transcript) (146)</td></tr><tr><td>RZ</td><td>Response to Request for Student Educational Record (Transcript) (147)</td></tr></table>	<u>Code</u>	<u>Description</u>	AK	Student Educational Record (Transcript) Acknowledgment (131)	ED	Student Educational Record (Transcript) (130)	RY	Request for Student Educational Record (Transcript) (146)	RZ	Response to Request for Student Educational Record (Transcript) (147)	M	ID	2/2	Must use
<u>Code</u>	<u>Description</u>															
AK	Student Educational Record (Transcript) Acknowledgment (131)															
ED	Student Educational Record (Transcript) (130)															
RY	Request for Student Educational Record (Transcript) (146)															
RZ	Response to Request for Student Educational Record (Transcript) (147)															
AK102	28	Group Control Number Description: Assigned number originated and maintained by the sender Note to User: This is the same as the Group Control Number (GS06/GE02) received in the GS/GE functional group envelope of the transmission being acknowledged.	M	N0	1/9	Must use										

Semantics:

1. AK101 is the functional ID found in the GS segment (GS01) in the functional group being acknowledged.
2. AK102 is the functional group control number found in the GS segment in the functional group being acknowledged.

AK2 Transaction Set Response Header

Pos: 030	Max: 1
Heading - Optional	
Loop: AK2	Elms: 2

To start acknowledgment of a single transaction set

Element Summary:

Ref	Id	Element Name	Req	Type	Min/Max	Usage
AK201	143	Transaction Set Identifier Code Description: Code uniquely identifying a Transaction Set <u>Code</u> <u>Description</u> 130 Student Educational Record (Transcript) 131 Student Educational Record (Transcript) Acknowledgment 146 Request for Student Educational Record (Transcript) 147 Response to Request for Student Educational Record (Transcript)	M	ID	3/3	Must use
AK202	329	Transaction Set Control Number Description: Identifying control number that must be unique within the transaction set functional group assigned by the originator for a transaction set Note to User: This is the same as the ST02/SE02 Transaction Set Control Number of the transaction set which is being acknowledged.	M	AN	4/9	Must use

Semantics:

1. AK201 is the transaction set ID found in the ST segment (ST01) in the transaction set being acknowledged.
2. AK202 is the transaction set control number found in the ST segment in the transaction set being acknowledged.

AK3 Data Segment Note

Pos: 040	Max: 1
Heading - Optional	
Loop: AK3	Elms: 4

To report errors in a data segment and identify the location of the data segment

Element Summary:

Ref	Id	Element Name	Req	Type	Min/Max	Usage																																																																																								
AK301	721	Segment ID Code Description: Code defining the segment ID of the data segment in error <table><tr><th>Code</th><th>Description</th></tr><tr><td>AAA</td><td>Request Validation</td></tr><tr><td>ATV</td><td>Student Activities and Awards</td></tr><tr><td>BGN</td><td>Beginning Segment</td></tr><tr><td>CRS</td><td>Course record</td></tr><tr><td>CSU</td><td>Supplemental Course Data</td></tr><tr><td>DEG</td><td>Degree Record</td></tr><tr><td>DMG</td><td>Demographic Information</td></tr><tr><td>DTP</td><td>Date or Time or Period</td></tr><tr><td>EMS</td><td>Employment Position</td></tr><tr><td>ERP</td><td>Educational Record Purpose</td></tr><tr><td>FOS</td><td>Field of Study</td></tr><tr><td>HC</td><td>Health Condition</td></tr><tr><td>HS</td><td>Health Screening</td></tr><tr><td>IMM</td><td>Immunization Status Code</td></tr><tr><td>IN1</td><td>Individual Identification</td></tr><tr><td>IN2</td><td>Individual Name Structure Components</td></tr><tr><td>IND</td><td>Additional Individual Demographic Information</td></tr><tr><td>LUI</td><td>Language Use</td></tr><tr><td>LX</td><td>Assigned Number</td></tr><tr><td>MKS</td><td>Marks Awarded</td></tr><tr><td>N1</td><td>Name</td></tr><tr><td>N2</td><td>Additional Name Information</td></tr><tr><td>N3</td><td>Address Information</td></tr><tr><td>N4</td><td>Geographic Location</td></tr><tr><td>NTE</td><td>Note/Special Instruction</td></tr><tr><td>OPS</td><td>Program Subject Area and Eligibility</td></tr><tr><td>OPX</td><td>Placement Criteria</td></tr><tr><td>PCL</td><td>Previous College</td></tr><tr><td>PER</td><td>Administrative Communications Contact</td></tr><tr><td>PWK</td><td>Paperwork</td></tr><tr><td>QTY</td><td>Quantity</td></tr><tr><td>RAP</td><td>Requirement, Attribute, and Proficiency</td></tr><tr><td>REF</td><td>Reference Identification</td></tr><tr><td>SBT</td><td>Subtest</td></tr><tr><td>SE</td><td>Transaction Set Trailer</td></tr><tr><td>SES</td><td>Academic Session Header</td></tr><tr><td>SP</td><td>Special Program</td></tr><tr><td>SRE</td><td>Test Scores</td></tr><tr><td>SSE</td><td>Entry and Exit Information</td></tr><tr><td>SST</td><td>Student Academic Status</td></tr><tr><td>ST</td><td>Transaction Set Header</td></tr><tr><td>SUM</td><td>Academic Summary</td></tr><tr><td>TST</td><td>Test Score Record</td></tr></table>	Code	Description	AAA	Request Validation	ATV	Student Activities and Awards	BGN	Beginning Segment	CRS	Course record	CSU	Supplemental Course Data	DEG	Degree Record	DMG	Demographic Information	DTP	Date or Time or Period	EMS	Employment Position	ERP	Educational Record Purpose	FOS	Field of Study	HC	Health Condition	HS	Health Screening	IMM	Immunization Status Code	IN1	Individual Identification	IN2	Individual Name Structure Components	IND	Additional Individual Demographic Information	LUI	Language Use	LX	Assigned Number	MKS	Marks Awarded	N1	Name	N2	Additional Name Information	N3	Address Information	N4	Geographic Location	NTE	Note/Special Instruction	OPS	Program Subject Area and Eligibility	OPX	Placement Criteria	PCL	Previous College	PER	Administrative Communications Contact	PWK	Paperwork	QTY	Quantity	RAP	Requirement, Attribute, and Proficiency	REF	Reference Identification	SBT	Subtest	SE	Transaction Set Trailer	SES	Academic Session Header	SP	Special Program	SRE	Test Scores	SSE	Entry and Exit Information	SST	Student Academic Status	ST	Transaction Set Header	SUM	Academic Summary	TST	Test Score Record	M	ID	2/3	Must use
Code	Description																																																																																													
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DMG	Demographic Information																																																																																													
DTP	Date or Time or Period																																																																																													
EMS	Employment Position																																																																																													
ERP	Educational Record Purpose																																																																																													
FOS	Field of Study																																																																																													
HC	Health Condition																																																																																													
HS	Health Screening																																																																																													
IMM	Immunization Status Code																																																																																													
IN1	Individual Identification																																																																																													
IN2	Individual Name Structure Components																																																																																													
IND	Additional Individual Demographic Information																																																																																													
LUI	Language Use																																																																																													
LX	Assigned Number																																																																																													
MKS	Marks Awarded																																																																																													
N1	Name																																																																																													
N2	Additional Name Information																																																																																													
N3	Address Information																																																																																													
N4	Geographic Location																																																																																													
NTE	Note/Special Instruction																																																																																													
OPS	Program Subject Area and Eligibility																																																																																													
OPX	Placement Criteria																																																																																													
PCL	Previous College																																																																																													
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<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>																		
AK302	719	Segment Position in Transaction Set Description: The numerical count position of this data segment from the start of the transaction set: the transaction set header is count position 1	M	N0	1/6	Must use																		
AK303	447	Loop Identifier Code Description: The loop ID number given on the transaction set diagram is the value for this data element in segments LS and LE	O	AN	1/6	Used																		
AK304	720	Segment Syntax Error Code Description: Code indicating error found based on the syntax editing of a segment <table><tr><th><u>Code</u></th><th><u>Description</u></th></tr><tr><td>1</td><td>Unrecognized segment ID</td></tr><tr><td>2</td><td>Unexpected segment</td></tr><tr><td>3</td><td>Mandatory segment missing</td></tr><tr><td>4</td><td>Loop Occurs Over Maximum Times</td></tr><tr><td>5</td><td>Segment Exceeds Maximum Use</td></tr><tr><td>6</td><td>Segment Not in Defined Transaction Set</td></tr><tr><td>7</td><td>Segment Not in Proper Sequence</td></tr><tr><td>8</td><td>Segment Has Data Element Errors</td></tr></table>	<u>Code</u>	<u>Description</u>	1	Unrecognized segment ID	2	Unexpected segment	3	Mandatory segment missing	4	Loop Occurs Over Maximum Times	5	Segment Exceeds Maximum Use	6	Segment Not in Defined Transaction Set	7	Segment Not in Proper Sequence	8	Segment Has Data Element Errors	O	ID	1/3	Used
<u>Code</u>	<u>Description</u>																							
1	Unrecognized segment ID																							
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3	Mandatory segment missing																							
4	Loop Occurs Over Maximum Times																							
5	Segment Exceeds Maximum Use																							
6	Segment Not in Defined Transaction Set																							
7	Segment Not in Proper Sequence																							
8	Segment Has Data Element Errors																							

AK4 Data Element Note

Pos: 050	Max: 99
Heading - Optional	
Loop: AK3	Elms: 4

To report errors in a data element or composite data structure and identify the location of the data element

Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>																						
AK401	C030	Position in Segment Description: Code indicating the relative position of a simple data element, or the relative position of a composite data structure combined with the relative position of the component data element within the composite data structure, in error; the count starts with 1 for the simple data element or composite data structure immediately following the segment ID	M	Comp		Must use																						
AK402	725	Data Element Reference Number Description: Reference number used to locate the data element in the Data Element Dictionary	O	N0	1/4	Used																						
AK403	723	Data Element Syntax Error Code Description: Code indicating the error found after syntax edits of a data element <table><tr><th><u>Code</u></th><th><u>Description</u></th></tr><tr><td>1</td><td>Mandatory data element missing</td></tr><tr><td>2</td><td>Conditional required data element missing.</td></tr><tr><td>3</td><td>Too many data elements.</td></tr><tr><td>4</td><td>Data element too short.</td></tr><tr><td>5</td><td>Data element too long.</td></tr><tr><td>6</td><td>Invalid character in data element.</td></tr><tr><td>7</td><td>Invalid code value.</td></tr><tr><td>8</td><td>Invalid Date</td></tr><tr><td>9</td><td>Invalid Time</td></tr><tr><td>10</td><td>Exclusion Condition Violated</td></tr></table>	<u>Code</u>	<u>Description</u>	1	Mandatory data element missing	2	Conditional required data element missing.	3	Too many data elements.	4	Data element too short.	5	Data element too long.	6	Invalid character in data element.	7	Invalid code value.	8	Invalid Date	9	Invalid Time	10	Exclusion Condition Violated	M	ID	1/3	Must use
<u>Code</u>	<u>Description</u>																											
1	Mandatory data element missing																											
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5	Data element too long.																											
6	Invalid character in data element.																											
7	Invalid code value.																											
8	Invalid Date																											
9	Invalid Time																											
10	Exclusion Condition Violated																											
AK404	724	Copy of Bad Data Element Description: This is a copy of the data element in error	O	AN	1/99	Used																						

Semantics:

1. In no case shall a value be used for AK404 that would generate a syntax error, e.g., an invalid character.

AK5 Transaction Set Response Trailer

Pos: 060	Max: 1
Heading - Mandatory	
Loop: AK2	Elms: 6

To acknowledge acceptance or rejection and report errors in a transaction set

Element Summary:

Ref	Id	Element Name	Req	Type	Min/Max	Usage																																				
AK501	717	Transaction Set Acknowledgment Code Description: Code indicating accept or reject condition based on the syntax editing of the transaction set <table><tr><th>Code</th><th>Description</th></tr><tr><td>A</td><td>Accepted</td></tr><tr><td>E</td><td>Accepted But Errors Were Noted</td></tr><tr><td>M</td><td>Rejected, Message Authentication Code (MAC) Failed</td></tr><tr><td>R</td><td>Rejected</td></tr><tr><td>W</td><td>Rejected, Assurance Failed Validity Tests</td></tr><tr><td>X</td><td>Rejected, Content After Decryption Could Not Be Analyzed</td></tr></table>	Code	Description	A	Accepted	E	Accepted But Errors Were Noted	M	Rejected, Message Authentication Code (MAC) Failed	R	Rejected	W	Rejected, Assurance Failed Validity Tests	X	Rejected, Content After Decryption Could Not Be Analyzed	M	ID	1/1	Must use																						
Code	Description																																									
A	Accepted																																									
E	Accepted But Errors Were Noted																																									
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R	Rejected																																									
W	Rejected, Assurance Failed Validity Tests																																									
X	Rejected, Content After Decryption Could Not Be Analyzed																																									
AK502	718	Transaction Set Syntax Error Code Description: Code indicating error found based on the syntax editing of a transaction set <table><tr><th>Code</th><th>Description</th></tr><tr><td>1</td><td>Transaction Set Not Supported</td></tr><tr><td>2</td><td>Transaction Set Trailer Missing</td></tr><tr><td>3</td><td>Transaction Set Control Number in Header and Trailer Do Not Match</td></tr><tr><td>4</td><td>Number of Included Segments Does Not Match Actual Count</td></tr><tr><td>5</td><td>One or More Segments in Error</td></tr><tr><td>6</td><td>Missing or Invalid Transaction Set Identifier</td></tr><tr><td>7</td><td>Missing or Invalid Transaction Set Control Number</td></tr><tr><td>8</td><td>Authentication Key Name Unknown</td></tr><tr><td>9</td><td>Encryption Key Name Unknown</td></tr><tr><td>10</td><td>Requested Service (Authentication or Encrypted) Not Available</td></tr><tr><td>11</td><td>Unknown Security Recipient</td></tr><tr><td>12</td><td>Incorrect Message Length (Encryption Only)</td></tr><tr><td>13</td><td>Message Authentication Code Failed</td></tr><tr><td>15</td><td>Unknown Security Originator</td></tr><tr><td>16</td><td>Syntax Error in Decrypted Text</td></tr><tr><td>17</td><td>Security Not Supported</td></tr><tr><td>23</td><td>Transaction Set Control Number Not Unique within the Functional Group</td></tr></table>	Code	Description	1	Transaction Set Not Supported	2	Transaction Set Trailer Missing	3	Transaction Set Control Number in Header and Trailer Do Not Match	4	Number of Included Segments Does Not Match Actual Count	5	One or More Segments in Error	6	Missing or Invalid Transaction Set Identifier	7	Missing or Invalid Transaction Set Control Number	8	Authentication Key Name Unknown	9	Encryption Key Name Unknown	10	Requested Service (Authentication or Encrypted) Not Available	11	Unknown Security Recipient	12	Incorrect Message Length (Encryption Only)	13	Message Authentication Code Failed	15	Unknown Security Originator	16	Syntax Error in Decrypted Text	17	Security Not Supported	23	Transaction Set Control Number Not Unique within the Functional Group	O	ID	1/3	Used
Code	Description																																									
1	Transaction Set Not Supported																																									
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6	Missing or Invalid Transaction Set Identifier																																									
7	Missing or Invalid Transaction Set Control Number																																									
8	Authentication Key Name Unknown																																									
9	Encryption Key Name Unknown																																									
10	Requested Service (Authentication or Encrypted) Not Available																																									
11	Unknown Security Recipient																																									
12	Incorrect Message Length (Encryption Only)																																									
13	Message Authentication Code Failed																																									
15	Unknown Security Originator																																									
16	Syntax Error in Decrypted Text																																									
17	Security Not Supported																																									
23	Transaction Set Control Number Not Unique within the Functional Group																																									
AK503	718	Transaction Set Syntax Error Code Description: Code indicating error found based on the syntax editing of a transaction set Note to User: Values are listed under AK502.	O	ID	1/3	Used																																				

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
AK504	718	Transaction Set Syntax Error Code Description: Code indicating error found based on the syntax editing of a transaction set Note to User: Values are listed under AK502.	O	ID	1/3	Used
AK505	718	Transaction Set Syntax Error Code Description: Code indicating error found based on the syntax editing of a transaction set Note to User: Values are listed under AK502.	O	ID	1/3	Used
AK506	718	Transaction Set Syntax Error Code Description: Code indicating error found based on the syntax editing of a transaction set Note to User: Values are listed under AK502.	O	ID	1/3	Used

AK9 Functional Group Response Trailer

Pos: 070	Max: 1
Heading - Mandatory	
Loop: N/A	Elms: 9

To acknowledge acceptance or rejection of a functional group and report the number of included transaction sets from the original trailer, the accepted sets, and the received sets in this functional group

Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
AK901	715	Functional Group Acknowledge Code Description: Code indicating accept or reject condition based on the syntax editing of the functional group <u>Code</u> <u>Description</u> A Accepted E Accepted But Errors Were Noted M Rejected, Message Authentication Code (MAC) Failed P Partially Accepted, At Least One Transaction Set Was Rejected R Rejected W Rejected, Assurance Failed Validity Tests X Rejected, Content After Decryption Could Not Be Analyzed	M	ID	1/1	Must use
AK902	97	Number of Transaction Sets Included Description: Total number of transaction sets included in the functional group or interchange (transmission) group terminated by the trailer containing this data element	M	N0	1/6	Must use
AK903	123	Number of Received Transaction Sets Description: Number of Transaction Sets received Note to User: If there were no discrepancies between reported and received, this number will match the value in AK902.	M	N0	1/6	Must use
AK904	2	Number of Accepted Transaction Sets Description: Number of accepted Transaction Sets in a Functional Group Note to User: If there were any rejected transaction sets, this number will be different from the values in AK902 and AK903.	M	N0	1/6	Must use

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
AK905	716	Functional Group Syntax Error Code Description: Code indicating error found based on the syntax editing of the functional group header and/or trailer <u>Code</u> <u>Description</u> 1 Functional Group Not Supported 2 Functional Group Version Not Supported 3 Functional Group Trailer Missing 4 Group Control Number in the Functional Group Header and Trailer Do Not Agree 5 Number of Included Transaction Sets Does Not Match Actual Count 6 Group Control Number Violates Syntax 10 Authentication Key Name Unknown 11 Encryption Key Name Unknown 12 Requested Service (Authentication or Encryption) Not Available 13 Unknown Security Recipient 14 Unknown Security Originator 15 Syntax Error in Decrypted Text 16 Security Not Supported 17 Incorrect Message Length (Encryption Only) 18 Message Authentication Code Failed	O	ID	1/3	Used
AK906	716	Functional Group Syntax Error Code Description: Code indicating error found based on the syntax editing of the functional group header and/or trailer Note to User: Values are listed under AK905.	O	ID	1/3	Used
AK907	716	Functional Group Syntax Error Code Description: Code indicating error found based on the syntax editing of the functional group header and/or trailer Note to User: Values are listed under AK905.	O	ID	1/3	Used
AK908	716	Functional Group Syntax Error Code Description: Code indicating error found based on the syntax editing of the functional group header and/or trailer Note to User: Values are listed under AK905.	O	ID	1/3	Used
AK909	716	Functional Group Syntax Error Code Description: Code indicating error found based on the syntax editing of the functional group header and/or trailer Note to User: Values are listed under AK905.	O	ID	1/3	Used

Comments:

1. If AK901 contains the value "A" or "E", then the transmitted functional group is accepted. If AK901 is 'R', then the transmitted group is rejected.

SE

Transaction Set Trailer

Pos: 080	Max: 1
Heading - Mandatory	
Loop: N/A	Elms: 2

To indicate the end of the transaction set and provide the count of the transmitted segments (including the beginning (ST) and ending (SE) segments)

Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
SE01	96	Number of Included Segments Description: Total number of segments included in a transaction set including ST and SE segments	M	N0	1/10	Must use
SE02	329	Transaction Set Control Number Description: Identifying control number that must be unique within the transaction set functional group assigned by the originator for a transaction set Note to User: This should contain the same value as that transmitted in ST02.	M	AN	4/9	Must use

Comments:

- SE is the last segment of each transaction set.

